Response to Restriction Requirement and

Preliminary Amendment

Serial No.: 10/776,599

SUGHRUE MION, PLLC Ref: Q79847

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the

application:

LISTING OF CLAIMS:

Claim 1 (original): A crimp state estimation apparatus for estimating a crimp state of a

crimp contact terminal when the crimp contact terminal comprising a bottom wall for positioning

a core wire of an electric wire and a pair of crimp pieces upright from opposite margins of the

bottom wall and the core wire are held between an anvil and a crimper and are crimped, the

crimp state estimation apparatus comprising:

an information input section for inputting information on the crimp contact terminal, the

electric wire, the anvil, and the crimper and an input compression ratio of the core wire; and

an estimation unit for calculating a total length of the bottom wall and the pair of crimp

pieces after crimp in a cross section orthogonal to the core wire based on the information and the

input compression ratio and estimating a cross-sectional shape of the bottom wall and the pair of

crimp pieces after crimp based on the total length.

Claim 2 (original):

The crimp state estimation apparatus according to claim 1 further

comprising:

a calculation unit for calculating a calculated compression ratio of the core wire based on

the information; and

3

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a crimp height calculation unit for finding spacing between the anvil and the crimper

applied when a difference between the input compression ratio and the calculated compression

ratio falls below a predetermined value.

Claim 3 (original): The crimp state estimation apparatus according to claim 2, wherein

the calculation unit calculates a total cross-sectional area of the core wire, the bottom

wall, and the pair of crimp pieces after crimp;

calculates a cross-sectional area of the crimp contact terminal after crimp;

calculates a cross-sectional area of the core wire after crimp based on the total cross-

sectional area and the cross-sectional area of the crimp contact terminal; and

calculates the calculated compression ratio of the core wire based on the cross-sectional

area of the core wire and a cross-sectional area of the core wire before crimp input to the

information input section.

Claims 4-6:

Cancelled.

4